very slightly descending anteriorly, very slightly angular in front, becoming rounded. Aperture lunate, moderately oblique; peristome thin, narrowly reflexed. Alt. 20.5, diam. 29.6, width of umbilicus 3 mm.

Amagisan, Izu. Type no. 85753 A. N. S. P., from no. 1140 of Mr. Hirase's collection.

This is one of the finest of the *japonica* group of species, resembling *G. jacobii* in contour, but much larger, with a comparatively wider umbilicus and darker in color. It is named in honor of Dr. O. von Moellendorff, in whose untimely death malacology has lost one of the most acute and industrious authorities upon Oriental snails.

Pristiloma japonica n. sp.

Shell minute, imperforate, discoidal, the upper surface very low, conoidal, base convex, periphery rounded; pale yellow, somewhat translucent, glossy and almost smooth, very faintly striate radially above. Whorls $5\frac{1}{3}$, slowly widening, slightly convex, the base impressed in the center. Aperture nearly vertical, narrowly lunate, the outer lip acute and thin, strengthened a short distance within by a white, callous ridge, showing as a buff streak outside; columellar margin narrowly reflexed at the insertion. Alt. 1.5, diam. 2.7 mm.

Toya, Kuziro, in eastern Yesso. Types no. 85754 A. N. S. P., from no. 1146 of Mr. Hirase's collection.

It is impossible to say whether this is really a *Pristiloma* until the jaw and teeth can be examined; but from the close resemblance of the shell to *P. lansingi*, the generic reference seems probable. There is no Oriental group to which it could properly be referred, to my knowledge. It is a new generic type for Japan.

NEW PISIDIA.

BY V. STERKI.

Pis. complanatum n. sp. Mussel inequipartite, slightly oblique, moderately inflated; superior margin short, somewhat curved, with rounded, more or less projecting angles at the scutum and scutellum; posterior part short, truncate, passing with a rounded angle in the inferior margin, which rises in a strong curve to the rounded-angular anterior end; supero-anterior slope not well marked, slightly curved;

beaks rather posterior, projecting over the hinge margin, slightly bulging anteriorly and posteriorly, flattened laterally ; surface with very fine, almost regular striæ and a few faint lines of growth, with a slight, silky gloss ; color light to brownish-horn ; shell scarcely translucent ; nacre thin, with the muscle insertions visible but not impressed ; hinge slight to moderately stout, plate rather narrow, right cardinal tooth curved, occupying the whole width of the plate, its anterior end abruptly thick and grooved or bifid, its ends are connected by the sharp, inferior edge of the plate, thus forming a groove ; left anterior cardinal tooth short, curved or angular, the posterior quite short, small, oblique ; lateral teeth moderately stout, with short, pointed cusps, the outer ones of the right valve quite small but distinct ; ligament short, comparatively stout.

Long. 3.2, alt. 2.8, diam. 1.8 mill.; long. 2.7, alt. 2.4, diam. 1.6 mill.

Habitat : Little Black Creek and lakes in Muskegon Co., Michigan, sent by Mr. Bryant Walker.

This species is different and distinct from all our Pisidia. It somewhat resembles *P. ultramontanum* Pr., but is much smaller, its beaks are narrower, of different shape and more prominent. Some of the specimens from the creek are higher over the beaks and in the posterior part, and thus the mussel is of a rather different shape. In others, the beaks are less flattened, laterally.

Pis. rowelli n. sp. Mussel well inflated, elliptical-ovate in outline, angles at scutum and scutellum slightly projecting, broadly rounded ; posterior margin just perceptibly subtruncate, supero-anterior slope slightly marked ; beaks a little posterior (" in normal position "), large, rounded, projecting over the hinge margin ; surface shining, slightly and irregularly striate, with a few coarser lines of growth ; horn colored to brownish over the beaks, usually with a lighter zone along the margins, not sharply defined ; shell translucent, rather thin ; hinge slight, plate rather narrow ; right cardinal tooth angular, with its posterior part thicker and grooved, left anterior short, triangular, placed high up on the plate, the posterior much longer, oblique, curved ; lateral teeth with rather short, abrupt cusps in the left valve ; the outer ones in the right valve small ; ligament slight.

Long. 7.5, alt. 6.2, diam. 4.5 mill.

Habitat : Near Sisson, at the foot of Mount Shasta, California, collected by Rev. J. Rowell.

This large and beautiful Pisidium cannot be mistaken for any other species. It seems to be related to *abditum* Hald., and some of the old-world Pisidia. Young specimens are very little inflated, and of a light, almost whitish color.

Pis. cuneiforme n. sp. Mussel inequipartite, oblique, moderately to rather well inflated, mostly so near the beaks; hinge margin slightly curved, the angles at the scutum and scutellum projecting; anterior part considerably longer, attenuated, somewhat cuneiform, and directed downward, the end rounded, supero-anterior slope well marked, straight or slightly curved; posterior part short, subtruncate; beaks moderately large and slightly elevated over the hinge margin; surface finely and irregularly striate, pale to yellowish horn-colored, or whitish, dull to shining; shell opaque to subtranslucent, thin; hinge slight, short, plate narrow; cardinal teeth placed far towards the anterior, well formed; the right curved, its posterior part slightly thicker and grooved; the left anterior well curved, the posterior slightly so, almost longitudinal and above the anterior, long; right lateral teeth slight, cusps low and rounded, the outer ones well formed; in the left valve the cusps are short, high, abrupt, pointed; ligament slight.

Long. 2.8, alt. 2.4, diam. 1.8 mill.

Habitat: Michigan and Minnesota. In Michigan: Byer's trout pond, Kent Co.; Blue Lake and Green Creek, Muskegon Co.; Hess Lake, Newaygo Co.; Lake Michigan, at High Id. Harbor. Clearwater River, Stearns Co., Minn. Collected by Messrs. Bryant Walker, H. E. Sargent and R. G. Kirkland.

Specimens were received in 1895, and again in '98 and '99, and then regarded as representing a distinct species. Yet the number of specimens from each place being limited, it seemed advisable to wait for more materials.

Pis. cuneiforme has some resemblance with *P. subtruncatum* Malm. and (var.) *cuneatum* Blz., of Europe; but the beaks are broader, less elevated; the surface striation and appearance are different, and the young of both show more differences between each other than the adult. Of our North American species, it has resemblance only with some forms of *P. compressum*, but our species is much smaller and its anterior part is longer, comparatively. Young and half-grown specimens are comparatively shorter, less inequipartite and less oblique.

A well-marked feature of the hinge is, as it seems, the relative position of the teeth, the distance between the cardinals and posterior lateral cusps being twice as long as that between the cardinals and anterior laterals. In other species, *e. g.*, *Pis. compressum*, *variabile*, *noveboracense*, that difference is much less marked, and in *P. virginicum* the cardinals are about equidistant from the laterals.

NEW LAND SNAILS FROM SOUTH AMERICA.

BY C. F. ANCEY.

Epiphragmophora orophila Anc.

Testa umbilicata, umbilico margine columellari fere prorsus obtecto, depressa, solidula, subnitida, fusco-olivacea, supra medium fascia fulva cincta, supra oblique et irregulariter striata, striis rugiformibus, subtus exilioribus, præterea passim et minute malleata atque spiraliter infra impressiuscula. Spira convexa, obtusa, late subconoidea. Anfractus $5\frac{1}{4}$ convexi, sutura impressa, in ultimo subirregulari discreti, ultimus relative magnus, antice sat breviter deflexus. Apertura obliqua, transverse oblonga, intus fuscula, fascia transmeante. Peristoma album, incrassatum, anguste expansum, basi reflexum et intus dilatatum, ad columellam late supra umbilicum eversum, marginibus sat remotis, basali declivi.

Diam. $29\frac{1}{2}$, min. 24, alt. 16 mill.

Hab. in Andibus Peruviæ.

This shell, received by MM. Sowerby and Fulton as *E. clausomphalos* (?), Dev. & Hupé, is quite unlike the latter, but is related to a species of smaller size that one of these gentlemen sent me some years ago as *E. Farrisi* Higg., or rather *E. Higginsi* Pfr., the former name being preoccupied. However it does not seem to correspond with the original diagnosis. The present species is larger, its surface is rough but of a plain brown color, ornamented with a brown band and the umbilicus is nearly closed.

Epiphragmophora Turtoni Anc.

This I have described in the journal as probably Bolivian, but subsequently my friend Mr. Gude has described from Paraguay an *E. Dormeri*, which appears to be very close to it and of which I have seen the type in his collection. Both are probably from the same